COLORADO DISCHARGE PERMIT SYSTEM (CDPS)
FACT SHEET FOR PERMIT NUMBER CO0022845
PAGOSA SPRINGS SANITATION DISTRICT'S WASTEWATER TREATMENT FACILITY
ARCHULETA COUNTY

I. TYPE OF PERMIT

A. Permit Type: Domestic - Minor Municipal, Lagoon System, Seventh Renewal

B. Discharge To: Surface Water

II. FACILITY INFORMATION

A. SIC Code: 4952 Sewerage Systems

B. Facility Classification: Class C per Section 100.5.2 of the Water and Wastewater Facility Operator Certification Requirements

C. Facility Location: 37° 15' 11.60" N, 107° 00' 40.03" W

D. Permitted Feature: 001 A, following chlorination and prior to entering the San Juan River 37° 15' 07.17" N, 107° 00' 36.89" W

The location provided above will serve as the point of compliance for this permit and is appropriate as it is located after all treatment and prior to discharge to the receiving water.

E. Facility Flows: 0.494 MGD

F. Major Changes From Last Renewal:

Facility changes include the addition of two 15 hp floating aerators and 100 submerged fine bubble diffusers that were added to Treatment Cell #1 in 2007, thus increasing the organic loading capacity from 625 BOD_5 lbs/day to 1030 BOD_5 lbs/day (Site Approval #4909).

Permit changes include the requirement for the permitee to test for mixing zone exclusion in accordance with the Colorado Mixing Zone Implementation Guidance. Additionally, the Division is requiring *E. coli* testing in place of fecal coliform as the fecal standard has been removed from regulation. A compliance schedule for total ammonia in July has also been added to the permit.

III. RECEIVING STREAM

A. Waterbody Identification: *COSJSJ06a, the San Juan River*

B. Water Quality Assessment:

An assessment of the stream standards, low flow data, and ambient stream data has been performed to determine the assimilative capacities for *the San Juan River* for potential pollutants of concern. This information, which is contained in the Water Quality Assessment (WQA) for this receiving stream, also includes an antidegradation review, where appropriate. The Division's Permits Section has reviewed the assimilative capacities to determine the appropriate water quality-based effluent limitations as well as potential limits based on the antidegradation evaluation, where applicable. The limitations based on the assessment and other evaluations conducted as part of this fact sheet can be found in Part I.A of the permit.

Permitted feature *001A* will continue to be the authorized discharge point to the receiving stream.

IV. FACILITY DESCRIPTION

A. Infiltration/Inflow (I/I):

Within the time period of the previous permit, it appears the Pagosa Springs Sanitation District's WWTF experienced undesirable levels of I/I (>120 gpd/person) in 10 months using the population size of 1600 people. After adjusting for tourist and visitor influxes, the Pagosa Springs Sanitation District's WWTF appears to have exceeded the 120 gpd/person twice, once in the spring of 2008 and once in the spring of 2009. The permitee has identified that compromised equipment was a source related to high I/I levels- in the spring of 2008 several feet of snow melt produced inflow at almost every manhole in the system. Because the sensor was wetted, the accuracy of measurement became questionable. While the described source of error may not cover all of the instances of exceedance, the WWTF is aware of I/I problems and is continuing work to identify and repair problem areas. Also, the town of Pagosa Springs has an ongoing sewer system maintenance, repair and rehabilitation program.

B. Lift Stations

Table IV-1 summarizes the information provided in the renewal application for the lift stations in the service area.

Table IV-1 Lift Station Summary

Station Name/#	Firm Pump Capacity (gpm)	Peak Flows (gpd)	% Capacity (based on peak flow)
KOA	2 pumps- 7.5 hp, 175 gpm	80,000	16
Chamber	2 pumps- 3 hp, 100 gpm	20,000	7
Apache St.	2 pumps- 3 hp, 100 gpm	20,000	7

C. Chemical Usage

The permittee stated in the application that they utilize two chemicals in their treatment process. The MSDS sheets have been reviewed and the following chemicals have been approved for use and are summarized in the following table.

Table IV-2 – Chemical Additives

Chemical Name	Purpose	Constituents of Concern
Chlorine gas (Cl_2)	Disinfectant	Chlorine gas, in small amounts, is poisonous
Sulfur Dioxide (SO_2)	Dechlorinate the effluent	Sulfur dioxide is toxic to aquatic life

Chemicals deemed acceptable for use in waters that will or may be discharged to waters of the State are acceptable only when used in accordance with all state and federal regulations, and in strict accordance with the manufacturer's site-specific instructions.

D. Treatment Facility, Facility Modifications and Capacities

The facility has undergone improvements that have altered the organic loading capacity. The upgraded facility consists of two mechanical surface aerators in conjunction with several banks of fine bubble diffusers. The new organic capacity is 1030 lbs BOD_5/day, which is specified in Site Approval # 4909. That document should be referred to for any additional information.

Pursuant to Section 100.5.2 of the Water and Wastewater Facility Operator Certification Requirements, this facility will require a Class C certified operator.

E. Sludge Disposal

Since the treatment facility consists of aerated lagoons, sludge removal will probably be infrequent (once every 5 to 10 years) and only take place if the ponds are drained and cleaned. If sludge is removed from the lagoons for any reason, it must be disposed of in accordance with local, State and Federal regulations.

1. EPA General Permit

   EPA Region 8 issued a General Permit (effective October 19, 2007) for Colorado facilities whose operations generate, treat, and/or use/dispose of sewage sludge by means of land application, landfill, and surface disposal under the National Pollutant Discharge Elimination System. All Colorado facilities are required to apply for and to obtain coverage under the EPA General Permit.

2. Biosolids Regulation (Regulation No. 64, Colorado Water Quality Control Commission)

While the EPA is now the issuing agency for biosolids permits, Colorado facilities that land apply biosolids must comply with requirements of Regulation No. 64, such as the submission of annual reports as discussed later in this rationale.

V. PERFORMANCE HISTORY

A. Monitoring Data

1. Discharge Monitoring Reports – The following tables summarize the effluent data reported on the Discharge Monitoring Reports (DMRs) for the last five years, from January 2007 through August 2012.

Table V-1 – Summary of DMR Data for Permitted Feature 001 A

Parameter	*# Samples or Reporting Periods*	*Reported Average Concentrations Avg/Min/Max*	*Reported Maximum Concentrations Avg/Min/Max*	*Previous Avg/Max/AD Permit Limit*	*Number of Limit Excursions*
Influent Flow (MGD)	*67*	*3.5/0.16/220*	*5.9/0.19/375*	*0.494**	*-*
Effluent Flow (MGD)	*68*	*0.23/0.16/0.58*	*0.29/0.17/0.65*	*0.494**	*-*
pH (su)	*68*	*7.6/7.2/8.3*	*8/7.4/8.9*	*6.5 – 9***	*0*
Fecal Coliform (#/100 ml)	*68*	*10/2/3000*	*11/2/7000*	*4200/8400****	*0*
TRC (mg/l)	*68*	*0.073/0.03/0.13*	*0.14/0.06/0.29*	*0.23*	*1*
NH3 as N, Tot (mg/l) Jan [1]	*6*	*20/12/26*	*20/12/26*	*25*	*1*
NH3 as N, Tot (mg/l) Feb [1]	*6*	*23/20/25*	*23/20/25*	*21*	*1*
NH3 as N, Tot (mg/l) Mar [1]	*6*	*17/13/20*	*17/13/21*	*16*	*2*
NH3 as N, Tot (mg/l) Apr [1]	*6*	*13/5/20*	*13/5/20*	*22*	*0*
NH3 as N, Tot (mg/l) May [1]	*6*	*19/11/28*	*19/11/28*	*43*	*0*
NH3 as N, Tot (mg/l) Jun [1]	*6*	*19/2/31*	*19/2/31*	*33*	*1*
NH3 as N, Tot (mg/l) Jul [1]	*6*	*17/2/28*	*17/2/28*	*26*	*1*
NH3 as N, Tot (mg/l) Aug [1]	*6*	*11/1/30*	*11/1/32*	*21*	*1*
NH3 as N, Tot (mg/l) Sep [1]	*5*	*11/1/31*	*11/1/31*	*20*	*1*
NH3 as N, Tot (mg/l) Oct [1]	*5*	*18/1/29*	*19/1/34*	*16*	*4*
NH3 as N, Tot (mg/l) Nov [1]	*5*	*19/6/29*	*19/6/29*	*18*	*1*
NH3 as N, Tot (mg/l) Dec [1]	*5*	*20/7/25*	*20/7/25*	*21*	*1*
BOD_5, effluent (mg/l)	*68*	*17/4/36*	*17/4/36*	*30/45*	*-*
BOD_5 (% removal)	*68*	*92/73/98*	*-*	*85 (min)*	*4*
TSS, effluent (mg/l)	*68*	*25/2/75*	*25/2/75*	*75/110*	*-*
TSS (% removal)	*66*	*89/58/98*	*-*	*85 (min)*	*13*
Oil and Grease (mg/l)	*68*	*0/0/0*	*-*	*10*	*0*
TDS (mg/l)	*22*	*581/6/780*	*-*	*Report*	*-*
PWS intake (mg/l)	*22*	*65/40/220*	*-*	*Report*	*-*

**This is a facility capacity and not a permit limit*

***The pH data shows the minimum reported values in the "average" column, and the maximum reported values in the maximum column*

****Geometric mean*

[1] *Until 9/30/2010, ammonia had an interim limit of 30 mg/l; monthly specific limits became effective 10/1/2010.*

B. Compliance With Terms and Conditions of Previous Permit

1. Effluent Limitations –The data shown in the preceding table indicate apparent violations of the permit.

a) Total Residual Chlorine- In August 2012, a value of 0.29 mg/l was reported; as it exceeds the 0.23

mg/l limit, the Division considers this an excursion. Because this excursion happened so recently, no remedies have yet been taken.

b) Total Ammonia- A compliance schedule for total ammonia was given until 9/30/2010 to meet permit limits, with an interim limit of 30 mg/l for all months. Instances which exceeded the 30 mg/l limit prior to 9/30/2010 were considered excursions, as well as the instances which exceeded month-specific limits after 9/30/2010.

c) BOD_5- There were 4 instances in which the BOD_5 removal rate was less than 85%. These occurrences are considered violations; however, they happened before March 2010, and have not happened in the past 2.5 years.

d) Total Suspended Solids- There were 13 instances in which the TSS removal rate was less than 85%. However, according to Section 62.5(3) of Regulations for Effluent Limitations, the 85 % removal requirement should have been waived in accordance with Regulation 62.5(3), for Pagosa Springs Sanitation District's WWTF because it has a stabilization pond and alternate limitations for TSS.

In accordance with 40 CFR Part 122.41(a), any permit noncompliance constitutes a violation of the Clean Water Act and is grounds for enforcement action; for permit termination, revocation and reissuance, or modification; or denial of a permit renewal application.

2. Other Permit Requirements – The permittee has been in compliance with all other aspects of the previous permit.

VI. DISCUSSION OF EFFLUENT LIMITATIONS

A. Regulatory Basis for Limitations

1. Technology Based Limitations

   a. Federal Effluent Limitation Guidelines – The Federal Effluent Limitation Guidelines for domestic wastewater treatment facilities are the secondary treatment standards. These standards have been adopted into, and are applied out of, Regulation 62, the Regulations for Effluent Limitations.

   b. Regulation 62: Regulations for Effluent Limitations – These Regulations include effluent limitations that apply to all discharges of wastewater to State waters and are shown in Section VIII of the WQA. These regulations are applicable to the discharge from the Town of Pagosa Springs Sanitation District WWTF.

2. Numeric Water Quality Standards - The WQA contains the evaluation of pollutants limited by water quality standards. The mass balance equation shown in Section VI of the WQA was used for most pollutants to calculate the potential water quality based effluent limitations (WQBELs), M_2, that could be discharged without causing the water quality standard to be violated. For ammonia, the AMMTOX Model was used to determine the maximum assimilative capacity of the receiving stream. A detailed discussion of the calculations for the maximum allowable concentrations for the relevant parameters of concern is provided in Section V of the Water Quality Assessment developed for this permitting action.

The maximum allowable effluent pollutant concentrations determined as part of these calculations represent the calculated effluent limits that would be protective of water quality. These are also known as the water quality-based effluent limits (WQBELs). Both acute and chronic WQBELs may be calculated based on acute and chronic standards, and these may be applied as daily maximum (acute) or 30-day average (chronic) limits.

3. Narrative Water Quality Standards - Section 31.11(1)(a)(iv) of The Basic Standards and Methodologies for Surface Waters (Regulation No. 31) includes the narrative standard that State surface waters shall be free of substances that are harmful to the beneficial uses or toxic to humans, animals, plants, or aquatic life.

   a. Whole Effluent Toxicity - The Water Quality Control Division has established the use of WET testing as a method for identifying and controlling toxic discharges from wastewater treatment facilities. WET testing is being utilized as a means to ensure that there are no discharges of pollutants "in amounts, concentrations or combinations which are harmful to the beneficial uses or toxic to humans, animals, plants, or aquatic life" as required by Section 31.11 (1) of the Basic Standards and Methodologies for Surface Waters. The requirements for WET testing are being implemented in accordance with Division policy, Implementation of the Narrative Standard for Toxicity in Discharge Permits Using Whole Effluent Toxicity (Sept 30, 2010). Note that this policy has recently been updated and the permittee should refer to this document for additional information regarding WET.

4. Water Quality Regulations, Policies, and Guidance Documents

   a. Antidegradation - Since the receiving water is Undesignated, an antidegradation review is required pursuant to Section 31.8 of The Basic Standards and Methodologies for Surface Water. As set forth in Section VII of the WQA, an antidegradation evaluation was conducted for pollutants when water quality impacts occurred and when the impacts were significant. Based on the antidegradation requirements and the reasonable potential analysis discussed above, antidegradation-based average concentrations (ADBACs) may be applied.

      According to Division procedures, the facility has three options related to antidegradation-based effluent limits: (1) the facility may accept ADBACs as permit limits (see Section VII of the WQA); (2) the facility may select permit limits based on their non-impact limit (NIL), which would result in the facility not being subject to an antidegradation review and thus the antidegradation-based average concentrations would not apply (the NILs are also contained in Section VII of the WQA); or (3) the facility may complete an alternatives analysis as set forth in Section 31.8(3)(d) of the regulations which would result in alternative antidegradation-based effluent limitations.

      The effluent must not cause or contribute to an exceedance of a water quality standard and therefore the WQBEL must be selected if it is lower than the NIL. Where the WQBEL is not the most restrictive, the discharger may choose between the NIL or the ADBAC: the NIL results in no increased water quality impact; the ADBAC results in an “insignificant” increase in water quality impact. The ADBAC limits are imposed as two-year average limits.

   b. Antibacksliding – As the receiving water is designated Reviewable, and the Division has performed an antidegradation evaluation, in accordance with the Antidegradation Guidance, the antibacksliding requirements in Regulation 61.10 have been met.

c. Determination of Total Maximum Daily Loads (TMDLs) – This stream segment is not on the State's 303(d) list, and therefore TMDLs do not apply.

d. Colorado Mixing Zone Regulations – Pursuant to section 31.10 of The Basic Standards and Methodologies for Surface Water, a mixing zone determination is required for this permitting action. The Colorado Mixing Zone Implementation Guidance, dated April 2002, identifies the process for determining the meaningful limit on the area impacted by a discharge to surface water where standards may be exceeded (i.e., regulatory mixing zone). This guidance document provides for certain exclusions from further analysis under the regulation, based on site-specific conditions.

The guidance document provides a mandatory, stepwise decision-making process for determining if the permit limits will not be affected by this regulation. Exclusion, based on Extreme Mixing Ratios, may be granted if the ratio of the facility design flow to the chronic low flow (30E3) is greater than 2:1 or if the ratio of the chronic low flow to the design flow is greater than 20:1. Since the ratio of the chronic low flow to the design flow is 14:1 the permittee must perform additional studies to determine if further requirements apply.

The remaining threshold tests require site-specific information that is currently not available and thus a determination cannot be made about how the regulation may affect the setting of effluent limits in this permit. Therefore, a compliance schedule is necessary for acquisition of this information, which will be used to complete the testing of exclusion thresholds before the next permit renewal.

f. Salinity Regulations – In compliance with the Colorado River Salinity Standards and the Colorado Discharge Permit System Regulations, the permittee shall monitor for total dissolved solids on a **quarterly** basis. Samples shall be taken at Permitted Feature 001A.

An evaluation of the discharge of total dissolved solids indicates that the Town of Pagosa Springs Sanitation District facility does not exceed the threshold of 1 ton/day or 366 tons/year of salinity. To determine the TDS loading from this facility, the average reported TDS values were multiplied by the average flow, then by 8.34. The average was determined to be 0.55 tons/day.

g. Reasonable Potential Analysis – Using the assimilative capacities contained in the WQA, an analysis must be performed to determine whether to include the calculated assimilative capacities as WQBELs in the permit. This reasonable potential (RP) analysis is based on the Determination of the Requirement to Include Water Quality Standards-Based Limits in CDPS Permits Based on Reasonable Potential, dated December, 2002. This guidance document utilizes both quantitative and qualitative approaches to establish RP depending on the amount of available data.

A qualitative determination of RP may be made where ancillary and/or additional treatment technologies are employed to reduce the concentrations of certain pollutants. Because it may be anticipated that the limits for a parameter could not be met without treatment, and the treatment is not coincidental to the movement of water through the facility, limits may be included to assure that treatment is maintained.

A qualitative determination of RP may be made where ancillary and/or additional treatment technologies are emploted to reduce the concentrations of certain pollutants, Because it may be anticipated that the limits for a parameter could not be met without treatment,

A qualitative RP determination may also be made where a federal ELG exists for a parameter, and where the results of a quantitative analysis results in no RP. As the federal ELG is typically less stringent than a limitation based on the WQBELs, if the discharge was to contain concentrations at the ELG (above the WQBEL), the discharge may cause or contribute to an exceedance of a water quality standard.

To conduct a quantitative RP analysis, a minimum of 10 effluent data points from the previous 5 years, should be used. The equations set out in the guidance for normal and lognormal distribution, where applicable, are used to calculate the maximum estimated pollutant concentration (MEPC). For data sets with non-detect values, and where at least 30% of the data set was greater than the detection level, MDLWIN software is used consistent with Division guidance to generate the mean and standard deviation, which are then used to establish the multipliers used to calculate the MEPC. If the MDLWIN program cannot be used the Division's guidance prescribes the use of best professional judgment.

For some parameters, recent effluent data or an appropriate number of data points may not be available, or collected data may be in the wrong form (dissolved vs total) and therefore may not be available for use in conducting an RP analysis. Thus, consistent with Division procedures, monitoring will be required to collect samples to support a RP analysis and subsequent decisions for a numeric limit. A compliance schedule may be added to the permit to require the request of an RP analysis once the appropriate data have been collected.

For other parameters, effluent data may be available to conduct a quantitative analysis, and therefore an RP analysis will be conducted to determine if there is RP for the effluent discharge to cause or contribute to exceedances of ambient water quality standards. The guidance specifies that if the MEPC exceeds the maximum allowable pollutant concentration (MAPC), limits must be established and where the MEPC is greater than half the MAPC (but less than the MAPC), monitoring must be established. Table VI-1 contains the calculated MEPC compared to the corresponding MAPC, and the results of the reasonable potential evaluation, for those parameters that met the data requirements. The RP determination is discussed for each parameter in the text below.

B. Table VI-1 – Reasonable Potential Analysis

Parameter	30-Day Average			7-Day Ave or Daily Max		
	MEPC	WQBEL (MAPC)	Reasonable Potential	MEPC	WQBEL (MAPC)	Reasonable Potential
E. coli (#/100 ml)	NA	205	Yes (Qual)	NA	410	Yes (Qual)
TRC (mg/l)	0.13	0.17	Yes (Qual)	0.38	0.23	Yes
NH3 as N, Tot (mg/l) Jan	26	25	Yes	26	65	Yes (Qual)
NH3 as N, Tot (mg/l) Feb	25	21	Yes	25	81	Yes (Qual)
NH3 as N, Tot (mg/l) Mar	20	16	Yes	21	54	Yes (Qual)
NH3 as N, Tot (mg/l) Apr	20	22	Yes (Qual)	20	95	Yes (Qual)
NH3 as N, Tot (mg/l) May	28	48	Yes (Qual)	28	105	Yes (Qual)
NH3 as N, Tot (mg/l) Jun	31	38	Yes (Qual)	31	93	Yes (Qual)
NH3 as N, Tot (mg/l) Jul	28	12	Yes	28	27	Yes
NH3 as N, Tot (mg/l) Aug	30	21	Yes	32	41	Yes (Qual)
NH3 as N, Tot (mg/l) Sep	31	20	Yes	31	43	Yes (Qual)
NH3 as N, Tot (mg/l) Oct	29	20	Yes	34	58	Yes (Qual)
NH3 as N, Tot (mg/l) Nov	29	20	Yes	29	73	Yes (Qual)
NH3 as N, Tot (mg/l) Dec	25	21	Yes	25	66	Yes (Qual)

Parameter Evaluation

BOD_5 and Total Suspended Solids – The concentration based limitations for these parameters are included in the permit based on Regulation 62. The limits for TSS are based off of the adjusted limits table as this is a lagoon facility. These limitations are effective upon the effective date of the permit.

BOD_5 and Total Suspended Solids- The TSS percent removal is waived based on the adjusted limits for lagoon facilities being applied in this permit. For BOD, according to Section 62.5(2) of the Regulations for Effluent Limitations "Where the permittee has demonstrated that the treatment facility is unable to meet the 85% removal requirement for a parameter and the inability to meet the requirement is not caused by excessive infiltration, as defined in 40 CFR 35.2005(b)(16), a lower percent removal requirement or a mass loading limit may be substituted provided that the permittee can demonstrate that the provisions of 40 CFR 133.103(d) can be met (note that these provisions echo those set out by the Regulations for Effluent Limitations and also indicate that the facility must essentially be well operated so as to be able to meet the proposed effluent limits). According to a previously submitted state-approved study, I/I is more cost effectively treated than removed, thus meeting the definition of nonexcessive I/I as per 40 CFR 35.2005(b)(28). Furthermore, the effluent data set forth in Table V-1 indicate that the facility will be able to comply with the proposed concentration effluent limits. Finally, the most recent Division inspection indicates satisfactory operations. Based on these findings, the Pagosa Springs Sanitation District's WWTF meets all provisions of 40 CFR 133.103(d) and therefore qualifies for a waiver. However, as per the regulations, a mass loading limit for BOD_5 is included in the permit.

Oil and Grease –The oil and grease limitations from the Regulations for Effluent Limitations are applied as they are the most stringent limitations. This limitation is the same as those contained in the previous permit and is imposed upon the effective date of this permit.

pH - This parameter is limited by the water quality standards of 6.5-9.0 s.u., as this range is more stringent than other applicable standards. This limitation is the same as that contained in the previous permit and is imposed upon the effective date of this permit.

E. coli – There were no data available for *E. coli*, as similar pathogens were detected through a fecal coliform test. Upon the effective date of this permit, the permitee is required to monitor *E. coli* rather than fecal coliform. A qualitative determination of RP has been made as the treatment facility has been designed to treat specifically for this parameter. As *E. coli* is a subset of fecal coliform, if the permitee's fecal coliform values are below that of the new *E. coli* limit, it is expected the permitee will be able to meet the *E. coli* limit. Because the last two years of fecal coliform data, with one exception, has been below the new *E. coli* limitation, the Division imposes the limit upon the effective date of the permit.

Total Residual Chlorine- The limitation for TRC is based upon the WQBEL/NIL as described in the WQA. A qualitative determination of RP has been made as chlorine is used in the treatment process. Previous monitoring, as shown in Table V-1, indicate that this limitation can be met and is therefore imposed upon the effective date of the permit.

Ammonia- The limitation for ammonia is based upon the WQBEL/NIL as described in the WQA. A qualitative determination of RP has been made as the influent is known to contain higher concentrations of ammonia that must be treated. A compliance schedule for the limits for the month of July has been added as this limit has become more stringent. All other monthly limits have become less stringent or stayed the same from the previous permit. Based on a conversation with the

new operator, the Division believes limits can be met for all months by using two aerators instead of one, which are already included in the facility description and site approval.

Temperature- Based on the information presented in the WQA, this facility is exempt from the temperature requirements based on flow ratios of 14:1.

Organics – The effluent is not expected or known to contain organic chemicals, and therefore, limitations for organic chemicals are not needed in this permit.

VII. ADDITIONAL TERMS AND CONDITIONS

A. Monitoring

Effluent Monitoring – Effluent monitoring will be required as shown in the permit document. Refer to the permit for locations of monitoring points. Monitoring requirements have been established in accordance with the frequencies and sample types set forth in the Baseline Monitoring Frequency, Sample Type, and Reduced Monitoring Frequency Policy for Industrial and Domestic Wastewater Treatment Facilities. This policy includes the methods for reduced monitoring frequencies based upon facility compliance as well as for considerations given in exchange for instream monitoring programs initiated by the permittee. Table VI-2 shows the results of the reduced monitoring frequency analysis for Permitted Feature 001 A, based upon compliance with the previous permit.

Based upon the reduced monitoring frequency analysis for Permitted Feature 001 A, shown in Table VI-2, the permittee is not eligible for reduced monitoring for ammonia and *E. coli*. Monitoring frequencies for pH and TRC have been further reduced than that shown in Table VI-2.

Table VI-2 – Monitoring Reduction Evaluation

Parameter	***Proposed Permit Limit***	***Average of 30-Day (or Daily Max) Average Conc.***	***Standard Deviation***	***Long Term Characterization (LTC)***	***Reduction Potential***
pH (su) Minimum	*min 6.5*	*7.6*	*0.17*	*7.26*	*1 Step*
pH (su) Maximum	*max 9.0*	*7.8*	*0.17*	*8.14*	
TRC (mg/l)	*0.17*	*0.081*	*0.017*	*0.115*	*2 Levels*

B. Reporting

1. Discharge Monitoring Report – The Town of Pagosa Springs Sanitation District facility must submit Discharge Monitoring Reports (DMRs) on a monthly basis to the Division. These reports should contain the required summarization of the test results for all parameters and monitoring frequencies shown in Part I.B of the permit. See the permit, Part I.B, C, D and/or E for details on such submission.

2. Special Reports – Special reports are required in the event of an upset, bypass, or other noncompliance. Please refer to Part II.A. of the permit for reporting requirements. As above, submittal of these reports to the US Environmental Protection Agency Region VIII is no longer required.

C. Signatory and Certification Requirements

Signatory and certification requirements for reports and submittals are discussed in Part I.E.6. of the permit.

D. Compliance Schedules

The following compliance schedules are included in the permit. See Part I.B of the permit for more information.

Ammonia- The permitee is given 2 years after the effective date of the permit to be in compliance with this parameter for the month of July.

All information and written reports required by the following compliance schedules should be directed to the Permits Section for final review unless otherwise stated.

E. Economic Reasonableness Evaluation

Section 25-8-503(8) of the revised (June 1985) Colorado Water Quality Control Act required the Division to "determine whether or not any or all of the water quality standard based effluent limitations are reasonably related to the economic, environmental, public health and energy impacts to the public and affected persons, and are in furtherance of the policies set forth in sections 25-8-192 and 25-8-104."

The Colorado Discharge Permit System Regulations, Regulation No. 61, further define this requirement under 61.11 and state: "Where economic, environmental, public health and energy impacts to the public and affected persons have been considered in the classifications and standards setting process, permits written to meet the standards may be presumed to have taken into consideration economic factors unless:

a. A new permit is issued where the discharge was not in existence at the time of the classification and standards rulemaking, or

b. In the case of a continuing discharge, additional information or factors have emerged that were not anticipated or considered at the time of the classification and standards rulemaking."

The evaluation for this permit shows that the Water Quality Control Commission, during their proceedings to adopt the Classifications and Numeric Standards for San Juan River and Dolores River Basins, considered economic reasonableness.

Furthermore, this is not a new discharger and no new information has been presented regarding the classifications and standards. Therefore, the water quality standard-based effluent limitations of this permit are determined to be reasonably related to the economic, environmental, public health and energy impacts to the public and affected persons and are in furtherance of the policies set forth in Sections 25-8-102 and 104. If the permittee disagrees with this finding, pursuant to 61.11(b)(ii) of the Colorado Discharge Permit System Regulations, the permittee should submit all pertinent information to the Division during the public notice period.

Jo Anna Beck
11/05/12

VIII. REFERENCES

A. Colorado Department of Public Health and Environment, Water Quality Control Division Files, for Permit Number CO0022845.

B. "Design Criteria Considered in the Review of Wastewater Treatment Facilities", Policy 96-1, Colorado Department of Public Health and Environment, Water Quality Control Commission, April 2007.

C. Basic Standards and Methodologies for Surface Water, Regulation No. 31, Colorado Department of Public Health and Environment, Water Quality Control Commission, effective September 30, 2012.

D. Classifications and Numeric Standards for San Juan River and Dolores River Basins, Regulation No. 34, Colorado Department of Public Health and Environment, Water Quality Control Commission, effective March 31, 2013.

E. Colorado Discharge Permit System Regulations, Regulation No. 61, Colorado Department of Public Health and Environment, Water Quality Control Commission, effective January 1, 2012.

F. Regulations for Effluent Limitations, Regulation No. 62, Colorado Department of Public Health and Environment, Water Quality Control Commission, effective July 30, 2012.

G. Pretreatment Regulations, Regulation No. 63, Colorado Department of Public Health and Environment, Water Quality Control Commission, effective April 01, 2007.

H. Biosolids Regulation, Regulation No. 64, Colorado Department of Public Health and Environment, Water Quality Control Commission, effective March 30, 2010.

I. Colorado River Salinity Standards, Regulation No. 39, Colorado Department of Public Health and Environment, Water Quality Control Commission, effective August 30, 1997.

J. Section 303(d) List of Water Quality Limited Segments Requiring TMDLs, Regulation No 93, Colorado Department of Public Health and Environment, Water Quality Control Commission, effective March 30, 2012.

K. Colorado's Section 303(d) List of Impaired Waters and Monitoring and Evaluation List, Regulation No 93, Colorado Department of Public Health and Environment, Water Quality Control Commission, effective April 30, 2010.

L. Antidegradation Significance Determination for New or Increased Water Quality Impacts, Procedural Guidance, Colorado Department of Public Health and Environment, Water Quality Control Division, effective December 2001.

M. Memorandum Re: First Update to (Antidegradation) Guidance Version 1.0, Colorado Department of Public Health and Environment, Water Quality Control Division, effective April 23, 2002.

N. Determination of the Requirement to Include Water Quality Standards-Based Limits in CDPS Permits Based on Reasonable Potential, Colorado Department of Public Health and Environment, Water Quality Control Division, effective December 2002.

O. The Colorado Mixing Zone Implementation Guidance, Colorado Department of Public Health and Environment, Water Quality Control Division, effective April 2002.

P. Baseline Monitoring Frequency, Sample Type, and Reduced Monitoring Frequency Policy for Domestic and Industrial Wastewater Treatment Facilities, Water Quality Control Division Policy WQP-20, May 1, 2007.

Q. Implementing Narrative Standards in Discharge Permits for the Protection of Irrigated Crops, Water Quality Control Division Policy WQP-24, March 10, 2008.

R. Implementing Narrative Standard for Toxicity in Discharge Permits Using Whole Effluent Toxicity (WET) Testing. Colorado Department of Public Health and Environment, Water Quality Control Division Policy Permits-1, September 30, 2010.

S. Policy for Conducting Assessments for Implementation of Temperature Standards in Discharge Permits, Colorado Department of Public Health and Environment, Water Quality Control Division, Policy Number WQP-23, effective July 3, 2008.

T. Policy for Permit Compliance Schedules, Colorado Department Public Health and Environment, Water Quality Control Division Policy Number WQP-30, effective December 2, 2010.

U. Procedural Regulations for Site Applications for Domestic Wastewater Treatment Works, Regulation No. 22, Colorado Department of Public Health and Environment, Water Quality Control Commission, effective September 30, 2009.

V. Regulation Controlling discharges to Storm Sewers, Regulation No. 65, Colorado Department of Public Health and Environment, Water Quality Control Commission, effective May 30, 2008.

W. Water and Wastewater Facility Operator Certification Requirements, Regulation No. 100, Colorado Department of Public Health and Environment, Water Quality Control Commission, effective September 30, 2007.

IX. PUBLIC NOTICE COMMENTS

The public notice period was from November 16, 2012, to December 17, 2012. No comments were received from the permittee during the public notice period.

Jo Anna Beck
1/15/13